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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/664,410	09/16/2003	Steven D. Girouard	279.464US1	3190
21186	7590	03/22/2006	EXAMINER	
SCHWEGMAN, LUNDBERG, WOESSNER & KLUTH 1600 TCF TOWER 121 SOUTH EIGHT STREET MINNEAPOLIS, MN 55402			LAYNO, CARL HERNANDZ	
			ART UNIT	PAPER NUMBER
			3766	

DATE MAILED: 03/22/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

10/664,410

Applicant(s)

GIROUARD ET AL.

Examiner

Carl H. Layno

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 16 September 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-17 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-3, 6, 10 and 17 is/are rejected.
- 7) ☒ Claim(s) 4, 5, 7-9 and 11-16 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 16 September 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Priority*

1. Acknowledgment is made of applicant's claim for priority filing as a Continuation-In-Part of U.S Application Serial No. 10/298,156, filed November 15, 2002.

### *Oath/Declaration*

2. Acknowledgment is made of applicant's new declaration, which was received by the Office on February 13, 2004.

### *Drawings*

3. Applicant's formal drawings were received by the Office on September 16, 2003 have been approved by the Examiner.

### *Claim Rejections - 35 USC § 102*

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

5. Claims 1-3, 6, 10, and 17 are rejected under 35 U.S.C. 102(e) as being anticipated by Zhu et al (US 2002/0169480-A1).

The Zhu et al (US 2002/0169480-A1) U.S Patent Application Publication describes an implantable device and method for preventing plaque formation in coronary arteries whose method of operation reads upon applicant's claimed method steps. Specifically, epicardial electrodes **25** (Fig.1) are positioned on an area over the coronary artery having plaque build-up (p.1, paragraph [0012], lines 8-10) or may, alternatively, be placed alongside coronary artery **36** (Fig.2) using an endocardial lead **22**. See electrodes **34** of Fig.2. In use, "non-excitatory" stimulation pulses are delivered to these electrodes during a refractory period of the heart rhythm (p.3, paragraph [0024], lines 14-20) prior to excitatory pacing pulses delivered by atrial and ventricular pacing circuits (**306,320** of Fig.3). Consequently, the Examiner considers these pulses to be "pre-excitation" pulses.

In regard to claims 2 and 10, cardiac rhythm management device 100 (Fig.3) is a dual-chambered pacemaker capable of entering a number of anti-arrhythmia modes of operation to treat atrial fibrillation, bradyarrhythmias, and tachyarrhythmias (p. 2, paragraphs [0016]-[0017] and [0019]).

In regard to claim 3, a controller 325 (Fig.3) triggers the delivery of pacing therapy pulses based upon detected "heart activity signals". See p.2, paragraph [0021], lines 1-3.

In regard to claim 6, pacing pulses are delivered to different parts of the heart. Fig.3 shows plaque prevention electrodes **25** located separately from atrial electrodes on lead **110A**, and ventricular electrodes on leads **110B** and **110C**. Again, plaque prevention therapy pulses are "non-excitatory" stimulation pulses which are delivered to electrodes **25** during a refractory period of the heart rhythm (p.3, paragraph [0024], lines 14-20) prior to excitatory pacing pulses delivered by atrial and ventricular pacing circuits (**306,320** of Fig.3).

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In regard to claim 17, though not shown, the implantable cardiac rhythm management device 100 (Fig.3) is, alternatively, capable of providing cardioversion/defibrillation therapy (p.2, paragraph [0018], lines 5-6, and also paragraph [0020], lines 5-6).

***Allowable Subject Matter***

6. Claims 4, 5, 7-9, and 11-16 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

***Conclusion***

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

The Kramer et al (US 6,628,988) and Ben-Haim (US 2002/0045809-A1) references are cited for their pertinent teachings of using multiple non-excitatory stimulation points within or on the heart for stress reduction of the heart wall. Unlike applicant's claims, no mention is made in either reference for using their stimulation therapy for treating coronary artery disease.

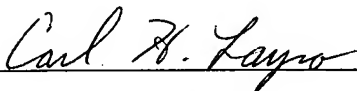
The Whitehurst et al (US 2003/0036773-A1) and Chekanov 6,201,991 references are cited for their pertinent treatment of coronary artery disease and arteriosclerosis, respectively. Although both references cite the use of stimulation adjacent to the coronary artery of a patient, neither specifies their use in combination with pacing pulses in the manner claimed by the applicant.

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8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Carl H. Layno whose telephone number is (571) 272-4949. The examiner can normally be reached on 9/4/5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Robert E. Pezzuto can be reached on (571) 272-6996. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).



CARL LAYNO  
PRIMARY EXAMINER

CHL  
3/20/2006